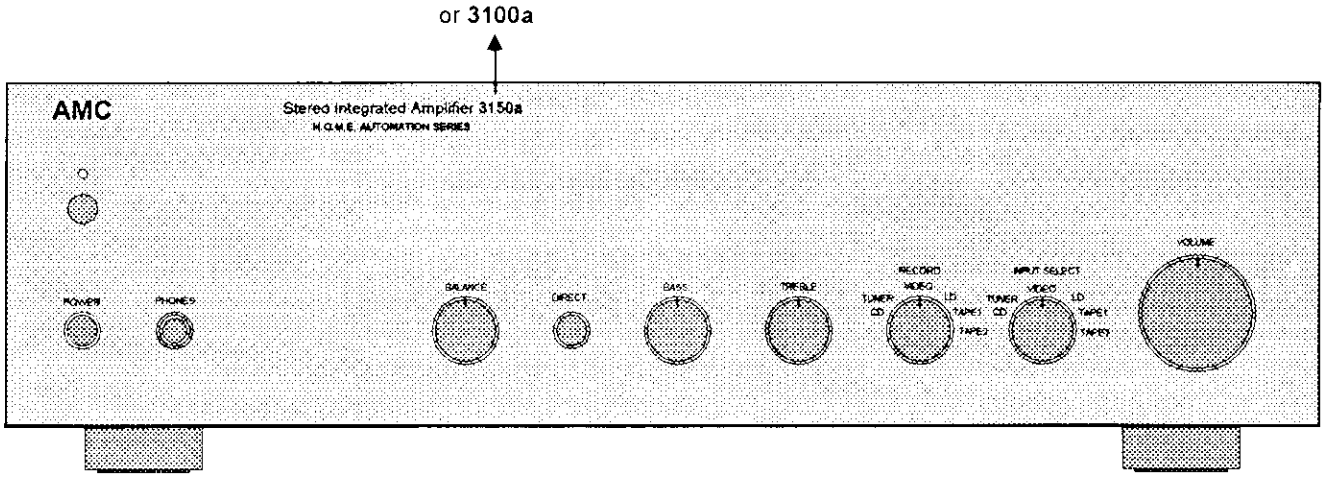
AMC 3150a 3100a

STEREO INTEGRATED AMPLIFIER

AMC™
HOME
Entertainment
Center



AMC
HI/EC PRODUCTS WITH 25 YEAR LIFE USING MODULE CONCEPT

INSTRUCTIONS FOR INSTALLATION AND OPERATION

CAUTION: TO REDUCE THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). NO USER-SERVICEABLE PARTS INSIDE. REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.

AFIN DEVITER UN CHOC ELECTRIQUE ET LES CONSEQUENCES GRAVES QUI POURRAIENT EN RESULTER, TENTEZ PAS D'OUVRIR L'APPAREIL ET DE TOUCHER AUX COMPOSANTS INTERNES SANS LA PRESENCE D'UNE PERSONNE QUALIFIEE.

PARA REDUCIR EL RIESGO DE SACUDIDAS ELECTRICAS, NO DEBERA QUITARSE LA TAPA (NI PARTE POSTERIOR). CONSULTESE AL PERSONAL CAPACITADO PARA LAS REPARACIONES INTERNAS.

WARNING: TO PREVENT FIRE OR ELECTRIC SHOCK, DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.

ADVERTENICIA: PARA EVITAR EL RIESGO DE INCENDIO O SACUDIDA ELECTRICA, NO DEBERA EXPONERSE ESTE APARATO A LA LLUVIA O HUMEDAD.

CAUTION: TO PREVENT ELECTRIC SHOCK DO NOT USE THIS (POLARISED) PLUG WITH AN EXTENSION CORD, RECEPTACLE OR OTHER OUTLET UNLESS THE BLADES CAN BE FULLY INSERTED TO PREVENT BLADE EXPOSURE.

ATTENTION: POUR PREVENIR LES CHOCS ELECTRIQUES NE PAS UTILISER CETTE FICHE POLARISEE AVEC UN PROLONGATEUR. UNE PRISE DE COURANT OU UNE AUTRE SORTIE DE COURANT, SAUF SILES LAMES PEUVENT ETRE INSEREES A FOND SANS EN LAISSER AUCuNE PARTIE FOND SANS EN LAISSER AUCUNE PARTIE A DECOUVERT.

PRECAUCION: PARA EVITAR SACUDIDAS ELECTRICAS, NO DEBERA UTILIZARSE ESTA CLAVIJA POLARIZADA CON UN CORDON DE PROLONGACION, RECEPTACULO U OTRO TIPO DE SALIDA A MENOS QUE SE HAYAN INSERTASO COMPLETAMENTE LAS LENGÜETAS PARA EVITAR SU EXPOSICION.

NOTE: Some AMC products are equipped with dual or multi-voltage transformers (which is indicated on the back panel). If you wish to change the voltage, please bring your unit to an authorised AMC service technician for internal conversion.

ATTENTION: Quelques pièces AMC sont munies de transformateurs à double ou à multi-voltage (indiqué au panneau arrière). Si vous voulez changer le voltage, veuillez apporter votre appareil au fournisseur de AMC pour le transformer.

ZUR BEACHTUNG: Einige AMC Geräte sind mit Umschaltern für unterschiedliche Netzspannungern ausgerüstet (Ein Vermerk auf der Rückseite weist darauf hin).
Die Anpassung, wenn notwendig, muß von einem qualifizieren Techniker in einer AMC Servicestation vorgenommen werden.

NOTA: Ciertos componentes de AMC están dotados de transformadores de doble tension o de varias tensiones (lo que se indica en el panel posterior). Si se desea cambiar la tensión, sírvanse llevar el aparato a un técnico autorizado por AMC para su conversión interna.

NOTE to CATV systems installer: This reminder is provided to call the CATV system installer's attention to Article 820-22 of the NEC that provides guidelines for proper grounding and, in particular, specifies that the cable ground shall be connected to the grounding system of the building, as close to the point of cable entry as practical.

NOTA PARA EL INSTALADOR DE ANTENAS DE TELEVISION COLECTIVAS: La presente advertencia se provee para llamar la atención del instalador al Artículo 820-22 de NEC (Córdigo Eléctrico Nacional) donde se facilitan las directrices para la pertinente puesta a tierra y que especifica en particular que el condutor a tierra del cable debe conectarse al sistema de conexión a tierra del edificio, lo más proximo posible al punto de entrada del cable.

The lightning flash with arrowhead, within an equilateral triangle, is intended to alert the user of the presence of uninsulated "dangerous voltage" within the product's enclosure; that may be of sufficient magnitude to constitute a risk of electric shock to persons.

The exclamation point within an equilateral triangle is intended to alert the user of the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

INTRODUCTION

The AMC Integrated Amplifier 3150a/3100a offers, in an innovative and elegant design, an affordable combination of high quality sound reproduction and comprehensive facilities.
The amplifier accepts six inputs (CD, Tuner, Video, LD, Tape1 in and Tape2 in) and has full tape monitoring capabilities.
To get the best from your amplifier please study this manual carefully. Should you experience any problems, please discuss with your dealer who has a full knowledge of AMC products for uses in a variety of systems.

INSTALLATION

Your AMC amplifier is set to work on your local mains supply voltage. Check that your local mains supply voltage agrees with the voltage setting indicated on the back panel of the amplifier. If not, please contact your dealer or national distributor for details on how to proceed further.
The cores of the mains lead are colored in accordance with the following code:
Blue -Neutral
Brown -Live
Note: Export units for certain markets have molded mains plugs fitted as standard.
As the colors in the mains lead may not correspond with the colored markings identifying the terminals in your plug,
proceed as follows:
The wire which is colored blue must be connected to the terminal which is marked by the letter N, or colored black or blue. The wire which is colored brown must be connected to the terminal which is marked by the letter L, or colored red or brown.

FUSES

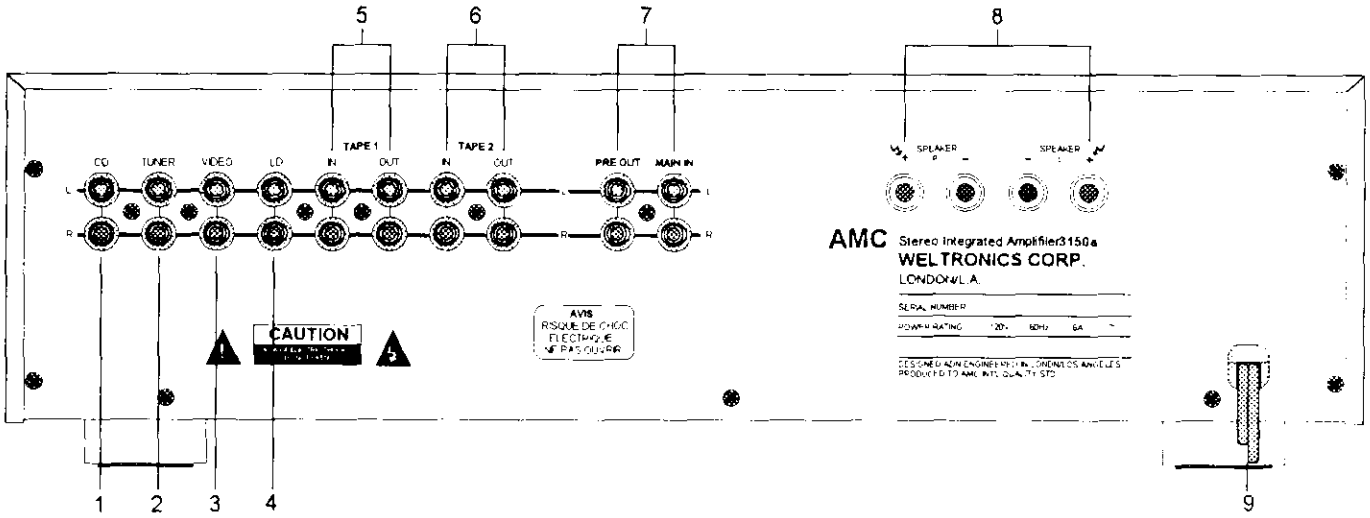
If the mains plug is fused, fit a 5 amp fuse. Your AMC amplifier contains fuses which are designed to protect the amplifier and prevent the unit from the occurrence of a dangerous fault condition. These should only be inspected and replaced by a competent engineer using the correct replacement types.

FEATURE

*The high overload tone control stage can be completely by-passed with the DIRECT switch to give natural sound quality.
*Special designed passive Tone control circuit to give natural sound quality.
*Uses audiophile grade components throughout, providing exceptional accuracy to tone control responses.
*High overload margin on tone control circuit by virtue of its topologies.
*Power amplifiers with 30 Amp high peak output current devices to offer capabilities to drive almost all types of speaker systems.
*Using high output current devices with optimized power supply designs, the power amplifiers can be only protected with fuses on power supplier side in order to deliver extremely high output current in demand to give superb sound quality.
*With universal power transformer passing all international safety standards, end users can use the unit in all countries by rewiring the voltage links inside the unit by authorized distributors or dealers.
*Heavy duty gold-plated speaker binding posts and phono connectors for ultra reliable connections.
*Toridal power transformer with thermal protection switch.

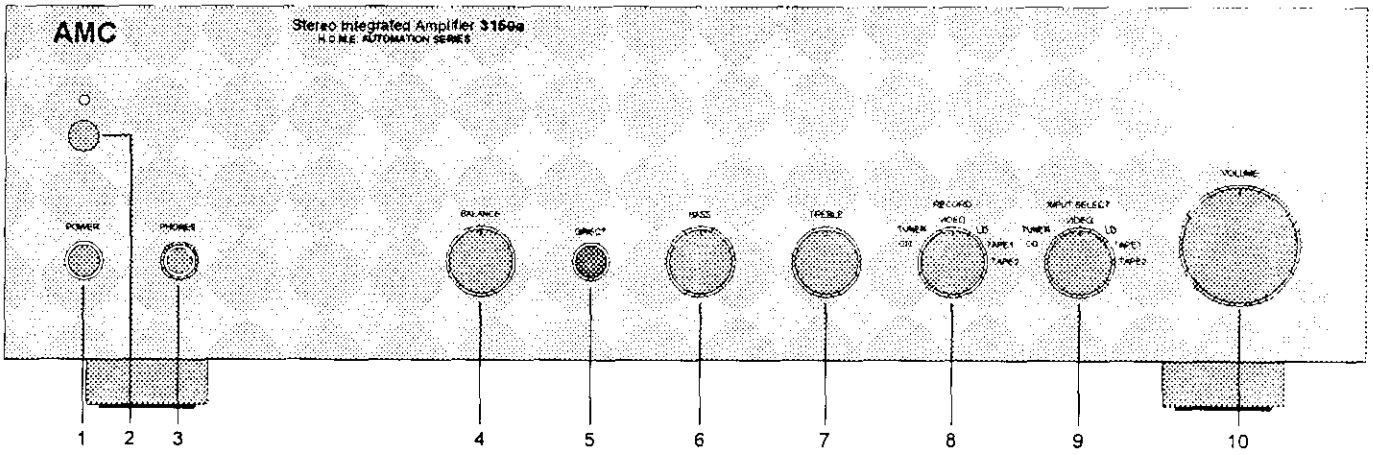
REAR PANEL CONNECTIONS/FRONT PANEL CONTROLS

REAR PANEL



1.CD INPUT
2.TUNER INPUT
3.VIDEO INPUT
4.LD INPUT
5.TAPE1 IN/OUT
6.TAPE2 IN/OUT
7.PRE OUT/MAIN IN
8.LOUDSPEAKER TERMINALS
9.AC LINE CORD

FRONT PANEL



1.POWER SWITCH
2.INFRARED RECEIVER
3.PHONES
4.BALANCE CONTROL
5.DIRECT SWITCH
6.BASS CONTROL
7.TREBLE CONTROL
8.RECORD SOURCE SELECTOR
9.INPUT SELECTOR
10.VOLUME CONTROL

REAR PANEL CONNECTIONS

CD INPUT
The CD input is suitable for use with any CD player. Connect your CD player to the amplifier using the phono sockets marked "CD".

TUNER INPUT
The Tuner input is suitable for use with most AM/FM tuners. Connect your tuner to the amplifier using the phono sockets marked "TUNER".

VIDEO,LD INPUTS
These VIDEO/LD inputs are suitable for use with the audio signal from a stereo VCR (or stereo TV/Satellite/Cable receiver) or other line level source. Using the phono/phono leads connect to the "Audio Out" of the unit to these inputs.
Note: These are audio inputs only.

TAPE1,TAPE2 INPUT/OUTPUT
This input is suitable for use with most cassette, reel to reel or video recorders.
Connect the "record" leads of your tape recorder to the phono sockets marked "TAPE OUT" on the rear of your amplifier using phono/phono leads.
Connect the "playback" leads of your tape recorder to the phono sockets marked "TAPE IN" on the rear of your amplifier using phono/phono leads.

PRE OUT /MAIN IN
Normally the preamplifier and power amplifier sections of this unit are connected together via factory-installed U-shaped metal jumpers that bridge the PRE-OUT and MAIN-IN jacks. Check to be sure that they are fully inserted into the jacks and that nothing is touching them.
By switching OFF the power and removing the metal jumpers, you can connect a signal processor such as a surround-sound decoder or an electronic crossover in the path between preamp and power amp. Connect a cable from PRE-OUT to the processor's input and a second cable from the processor's output to MAIN IN.

LOUDSPEAKERS
Your AMC amplifier is designed to drive loud-speakers with a nominal impedance of 4-8 ohms.

LOUDSPEAKER CONNECTIONS
The loudspeaker output terminals will accept 4mm (banana) plugs, spade connectors, pin connectors or bare wires.
Connect the negative side (usually black) of your left hand loudspeaker lead to the black terminal of the two terminals marked "L" on the rear of your amplifier. The other side of your left hand speaker lead (the positive side or red) should be connected to the red terminal marked "L". Repeat this operation for the right hand loudspeaker.
Your AMC amplifier is capable of generating high peak currents, so all connections must be checked to avoid inadvertent short circuits and to ensure a good clean contact.
UNDER NO CIRCUMSTANCES SHOULD THE OUTPUTS BE SHORTED TOGETHER.
Such action will damage output circuitry and is not covered by guarantee.

AC LINE CORD
Plug the AC line cord into a nearby wall outlet that provides the correct AC power line voltage, or into an unswitched convenience outlet on any AMC products.

HEATSINK/VENTILATION REQUIREMENTS
The heat produced by your AMC amplifier during normal operation is dissipated by an internal finned heatsink. It is perfectly normal for your amplifier to becomes quite warm and to radiate heat when in use, especially if it is run near full power. However, if it becomes too hot to touch, switch off at once and contact your dealer.
It is very important that there is adequate ventilation for the whole of the amplifier. Do not place the unit on a rug or other soft surface that it could sink into, obstructing the air inlets on its underside, and take care not to obstruct the outlet grille on the top cover.

FRONT PANEL CONTROLS

POWER SWITCH

The amplifier is turned on by depressing the power switch. The small indicator above the switch will glow green. Before switching on, always set the volume control to minimum to avoid damage to your loudspeakers.

Note: Your AMC amplifier will play music almost immediately after being switched on. However ,in common with other audiophile products, the internal circuits take some time to stabilize fully, and the best possible sound quality may not be obtained until the amplifier has had some time (possibly an hour or two) to warm up.

INFRARED RECEIVER

The infrared receiver for receiving the infra-red signals from your remote handset.

PHONES

The headphone socket will accept any headphones fitted with a standard 1/4"(6 35mm) stereo jack plug. When Headphones are in use, the output will be cut and all the amplifier functions will operate as normal.

BALANCE CONTROL

The Balance Control adjusts the relative levels of the left and right channels. It has no effect on recordings being made. A detent at the 12 o'clock position marks the point of equal balance. Rotation of the Balance Control to the right (clockwise)decreases the level of the left channel so that only the right channel is heard. Rotation to the left shifts the sonic image toward the left speaker.

Adjust the Balance Control to produce a natural spread of sound across the space between the speakers, with any monophonic sound (such as a radio announcer's voice) appearing as a phantom image centered midway between them.

Recordings often contain small errors in channel balance, typically no more than 2dB; but this is enough to degrade stereo imaging. Small compensating changes in the setting of the Balance Control can significantly improve the depth and stability of the stereo image.

DIRECT SWITCH

When this button is pressed the Bass and Treble circuits are completely bypassed, restoring precisely flat frequency response. When this button is pressed again, the switch will be turned off, the tone controls operate normally. By adjusting the tone controls and then switching them in and out of the signal path, you can evaluate their effect on the sound.

BASS CONTROL

The Bass Control adjusts the relative level of the low frequencies in the sound. The electrical response of the amplifier is flattest when the control is set in the detent or 12 o'clock position. Rotation of the knob to the right (clockwise) increases the level of low frequency sounds, and rotation counter-clock-wise decreases their level. Adjust the Bass Control to achieve the tonal balance that sounds most natural to you.

TREBLE CONTROL

The Treble Control adjusts the relative level of the high frequencies in the sound. The response of the amplifier is flattest when the control is set in the detent or 12 o'clock position. Rotation of the Treble Control to the right (clockwise) increases the level of high frequency sounds, and rotation counter-clockwise decreases their level. Adjust Treble Control to achieve the tonal balance sounds most natural to you.

RECORD SOURCE SELECTOR

This switch selects the input signal for recording. (to TAPE OUTPUTS on rear panel)

(1) TAPE RECORDING:

All sources CD, Tuner,Video, LD, Tape1 and Tape2 can be recorded via the tape connections. To record an input, select the required source and set your recorder to the record mode.

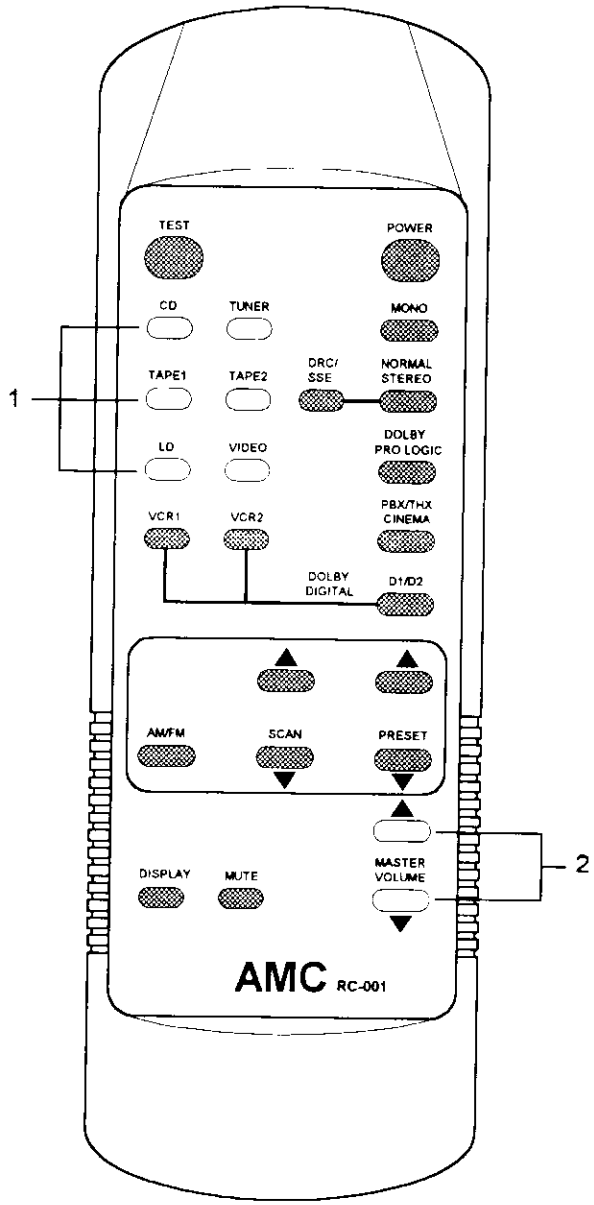
To record from one tape recorder to another, the playback recorder should be plugged into the "TAPE1 IN" socket, and the recording machine into the "TAPE2 OUT" socket. The RECORD selector switch should be set to "TAPE1". A recording can now be made in the normal way.

(2) TAPE PLAYBACK:
Set the input select switch to the "Tape1" (or "Tape2") position and set your recorder into the playback mode.

INPUT SELECTION
The rotary input selector switch selects which input signal (CD, Tuner, Video, LD, Tape1 or Tape2) is fed to the power amplifier.

VOLUME CONTROL
The volume control adjusts the overall loudness level of the sound. It has no effect on the level of the signals fed to the TAPE OUT jacks for tape recording. The Volume control is designed for accurate tracking of its two channels, so that the stereo balance will not shift noticeably as the loudness of the sound is varied.

REMOTE CONTROL (RC-001)



1. INPUT SELECTOR

These buttons select any one of the six sources that are connected to the inputs of the AMC 3150a/3100a (CD, TUNER, TAPE1, TAPE2, LD & VIDEO)

2. MASTER VOLUME

△:VOLUME UP

▽:VOLUME DOWN

3. OTHER BUTTONS WITH

Buttons on the RC-001 remote control that are not mentioned above, are for use on other AMC high end Audio/Video products.

SPECIFICATIONS

	3100a	3150a
Rated Power into 8 ohm	100W	150W
With both channels driven		
Rated T.H.D. 20Hz-20KHz	0.03%	0.03%
1KHz clipping power into 8 ohm	110W	160W
Input sensitivity for 1W/Rated Power into 8 ohms:		
High level inputs	15mV/200mV	15mV/200mV
Input impedance:		
High level inputs	20K ohms	20K ohms
Frequency response:		
Tone bypass 20Hz-20KHz	+/-0.2dB	+/-0.2dB
Normal 20Hz-20KHz	+/-0.5dB	+/-0.5dB
High level inputs -3dB	<10Hz/>100KHz	<10Hz/>100KHz
Signal to noise ratio (ref. 1W/8 ohms):		
High level inputs "A" WTD	85dB	85dB
Separation 20Hz-20KHz	75dB	75dB
Tone control range:		
Bass at 100Hz	+/-9dB	+/-9dB
Treble at 10KHz	+/-8dB	+/-8dB
OTHERS		
Dimensions (WxHxD)	430x112x288mm	430x112x288mm
Net weight	10.8Kg	12.2Kg
Shipping weight (2pieces)	23.2Kg	26Kg

SAFETY INSTRUCTION

1. READ INSTRUCTIONS
All the safety and operating instructions should be read before the appliance is operated.

2. RETAIN INSTRUCTIONS
The safety and operating instructions should be retained for future reference.

3. HEED WARNINGS
All warnings on the appliance and in the operating instructions should be adhered to.

4. FOLLOW INSTRUCTIONS
All operating and use instructions should be followed.

5. WATER AND MOISTURE
The appliance should not be used near water– for example, near a bathtub, washbowl, kitchen sink, laundry tub, in a wet basement, or near a swimming pool, etc.

6. CARTS AND STANDS
The appliance should be used only with a cart or stand that is recommended by the manufacturer.

6A.
An appliance and cart combination should be moved with care. Quick stops, excessive force, and uneven surfaces may cause the appliance and cart combination to overturn.

7. WALL OR CEILING MOUNTING
This equipment is not designed for use mounted on a wall or a ceiling.

8. VENTILATION
The appliance should be situated so that its location or position does not interfere with its proper ventilation. For example, the appliance should not be situated on a bed, sofa, rug, or similar surface that may block the ventilation openings; or placed in a built-in installation, such as bookcase or cabinet that may impede the flow of air through the ventilation openings.

9. HEAT
The appliance should be situated away from heat sources such as radiators, heat registers, stoves, or other appliances (including amplifiers) that produce heat.

10. POWER SOURCES
The appliance should be connected to a power supply only of the type described in the operating instructions or as marked on the appliance.

11. POWER-CORD PROTECTION
Power-supply cords should be routed so that they are not likely to be walked on or pinched by items placed upon or against them, paying particular attention to cords at plugs, convenience receptacles, and the point where they exit from the appliance.

12. CLEANING
The appliance should be cleaned only as recommended by the manufacturer.

13. NON USE PERIODS
The power cord of the appliance should be unplugged from the outlet when left unused for a long period of time.

14. OBJECT AND LIQUID ENTRY
Care should be taken so that objects do not fall and liquids are not spilled into the enclosure through openings.

15. SERVICING
The user should not attempt to service the appliance beyond that described in the operating instructions. All other servicing should be referred to qualified service personnel.

16. DAMAGE REQUIRING SERVICE
The appliance should be serviced by qualified service personnel when:

a) The power-supply cord or the plug has been damaged; or

b) Objects have fallen, or liquid has been spilled into the appliance; or

c) The appliance has been exposed to rain; or

d) The appliance does not appear to operate normally or exhibits a marked change in performance; or

e) The appliance has been dropped, or the enclosure damaged.

17. POWER LINES
(APPLIES TO TUNER AND RECEIVERS ONLY)
An outdoor antenna should be located away from power lines.

18. OUTDOOR ANTENNA GROUNDING
(APPLIES TO TUNER AND RECEIVERS ONLY)
If an outside antenna is connected to the receiver, be sure the antenna system is grounded so as to provide some protection against voltage surges and built up static charges.

Section 810 of the National Electrical Code, ANSI/NFPA No. 70-1984, provides information with respect to proper grounding of the mast and supporting structure, grounding of the lead-in wire to an antenna discharge unit, size of grounding conductors, location of antenna-discharge unit, connection to grounding electrodes, and requirements for the grounding electrode. See Figure.

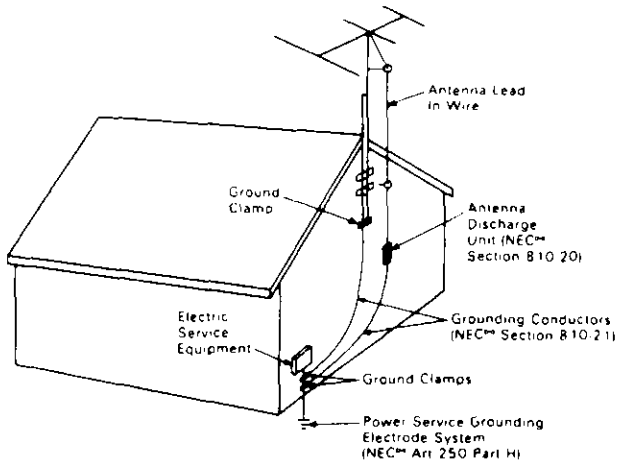
a) Use No. 10 AWG (5.3 mm^2) copper, No. 8 AWG (8.4mm^2) aluminum, No. 17 AWG (1.0mm^2) copper-clad steel or bronze wire, or larger, as a ground wire.

b) Secure antenna lead-in and ground wires to house with stand-off insulators spaced from 4–6 feet (1.22–1.83 m) apart.

c) Mount antenna discharge unit as close as possible to where lead-in enters house.

d) Use jumper wire not smaller than No. 6 AWG (13.3 mm^2) copper, or the equivalent, when a separate antenna-grounding electrode is used. See NEC Section 810-21(j).

Antenna Grounding According to the National Electrical Code


Antenna Lead in Wire
Ground Clamp
Antenna Discharge Unit (NEC* Section 810-20)
Electric Service Equipment
Grounding Conductors (NEC* Section 810-21)
Ground Clamps
Power Service Grounding Electrode System (NEC* Art 250 Part H)

*National Electrical Code Available from Library book stores, or National Fire Protection Association (Batterymarch Park, Quincy, MA 02269)

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